

REMARKS

This response amends claims 1, 4-6, 16-18, 22, 24 and 25, and cancels claims 10, 12, 19. Support for the amendments can be found, e.g., at pages 10-13 of the specification. Upon amendment, this application will have 4 independent claims (claims 1, 16, 22 and 24) and 23 total claims (claims 1-9, 11, 13-18 and 20-26). When the application was filed, official fee for excess claims was paid for up to 4 independent claims and 26 total claims. Thus, no additional fee is due.

In section 1 of the Office Action, the Examiner rejects claims 1, 3, 7-12, 15-19, and 21-23 under 35 USC 102(b) as being anticipated by Kauser (US Patent No. 5,724,660). Moreover, in section 2, claims 2, 13, 14, and 20 are rejected under 35 USC 103(a) as being unpatentable over Kauser in view of Walsh (US Patent No. 6,603,977). In section 3, claim 4 is rejected under 35 USC 103(a) as being unpatentable over Kauser in view of Smith (US Patent No. 6,167,274). In section 4, claims 5 and 24-26 are rejected under 35 USC 103(a) as being unpatentable over Kauser in view of Smith and further in view of Rangedahl (US Patent No. 5,790,074). In section 5, claim 6 is rejected under 35 USC 103(a) as being unpatentable over Kauser in view of Smith and further in view of Rangedahl and Asahi (EP 0785535). These rejections are respectfully traversed.

Kauser, Walsh, Smith, Rangedahl and Asahi, standing alone or in combination, fail to disclose, teach, or suggest, *inter alia*, the following features recited by the amended claim 1 of the present application:

“obtaining a locality indicator using the cellular radio communication sub-system, the locality indicator indicating a current locality of the mobile device”;

“extracting local information from transmitted data received from a transmission source by the short-range communication sub-system, the local information being information other than location information”; and

“using the locality indicator and local information in combination as characterising data to access a data record associated with the source of the transmitted data, and then using that data record to retrieve specific information having a relation to the current location of the mobile device”.

Kauser concerns a method and apparatus for determining the location of a mobile phone. More particularly, the location of the mobile phone is determined in two ways:

Firstly, the location is determined by using the cellular phone system 200 (Fig. 2) to determine the cell in which the phone currently resides (called “zone 1” - see col. 6, lines 15-21), and a position in the cell (called “zone 2” - see col. 6, lines 21-23) as calculated using measurements of signals from several base stations 214. How “zone 2” is calculated is described at col. 6, line 24 to col. 9, line 18.

Secondly, the location is determined by using a GPS receiver together with some processing to determine when readings might be in error (described between col. 9, line 19 and col. 11, line 26). Based on whether the GPS reading is considered reliable and the correspondence between the GPS reading and the zones determined from the cell phone system, a location for

the mobile phone is output together with a confidence indicator (this process is shown in Fig. 10). The output location will either be the GPS reading or the zone 2 reading.

Kauser uses cell ID (zone 1) as the locality indicator, which is similar to that feature of the present application. Other than that, the Kauser arrangement is quite different from the claimed invention. For example, Kauser does not use a short-range communication subsystem to receive transmitted data from which local information is extracted for use with the locality indicator to guide a database search.

The Examiner equates the cell-phone base station 214 of Kauser with the wide-area communication subsystem of the claimed invention, but ignores the claimed limitation that the wide-area communication system is part of the mobile device, rather than part of the fixed cellular infrastructure.

Moreover, the Examiner equates the cellular radio system of Kauser with the short-range communication subsystem in the claimed invention. In other words, the Examiner identifies the cellular radio system of Kauser as both the wide-area communication subsystem and the short-range communication subsystem in the claimed invention. The amended claim 1 has made it clear that these two systems are two distinct communication subsystems.

Further, claim 1 recites that "extracting local information from transmitted data received from a transmission source by the short-range

communication sub-system". This is clearly different from the determination of "zone 2" in Kauser where the mobile phone collects signal strength measurements and returns them to the cellular radio infrastructure (see col. 4, lines 32-41).

The Examiner asserts that Kauser uses the locality indicator ("zone 1") and the local information ("zone 2") in combination to retrieve "specific information". The Applicants respectfully disagree. Even if the GPS reading can be considered "specific information", it is not **retrieved** on the basis of the zone information though it may be output in dependence on its relation to the zone readings. Also, there is no "data record" in Kauser for the source of the "local information".

As of Walsh, it simply teaches a system in which short-range transceivers are distributed throughout an environment (see transceivers 206 to 209 in Fig. 2). The location of each device is determined/input (see location entry device 202) and then stored in a memory 204 of the system. When a user device accesses one of the short-range transceivers, it can retrieve the location of the transceiver for use, for example in making an E911 call using a cell phone. In fact, the whole purpose of the system is to reliably provide location data in environments where cellular location techniques may not work. Walsh is hardly related to limitations of claim 1.

Smith describes an arrangement for using a cellular radio system to find the location of a mobile device within a cell. In this arrangement, a database is used to store, for locations within a given cell, signal strength readings for signals from neighboring cells (see Fig. 5). Thus, a locality

indicator is derived as the current cell ID, and information about local signal strengths is also derived. The signal strength data and the cell ID are then used to do a database look-up to find the location of the mobile device concerned. Like Kauser, Smith only uses a single communication subsystem to determine both the locality indicator and the local signal strength readings, and does not use local information extracted from transmitted data. Furthermore, the Smith arrangement does not store data records each holding local data transmitted by a respective short-range transmission source. Thus, Smith does not teach or suggest the above-quoted features of claim 1.

Rangedahl discloses a system for verifying the location of a remote device and authorizing its operation only if it is in an allowed geographic location. Location is determined either by a GPS system in the remote device or by using caller ID for a fixed phone being used by the device to contact the authorization center. Once the location of the remote device is established, the authorization center does a database look-up to see if the device is authorized for operation at that location. Clearly, the Rangedahl system is very different from the features recited by claim 1 of the present application.

Asahi is relied upon only with respect to features of claim 6. The Examiner does not show that Asahi teaches or suggests features of claim 1 (the base claim).

MPEP 2131 states that a "claim is anticipated only if **each and every element** as set forth in the claim is found, either expressly or inherently

described, in a single prior art reference,” quoting *Verdegaal Bros v. Union Oil Co. of California*, 814 F.2d 628, 631 (Fed. Cir. 1987). Under MPEP 2143, to establish a prima facie case of obviousness, the prior art reference (or references when combined) must teach or suggest all claim limitations. Since the cited references do not teach or suggested the above-quoted features of claim 1, the Applicants respectfully submit that claim 1 is patentable. Claims 2-9, 11, and 13-15 are also patentable, at least by virtue of their dependency from claim 1.

Similarly, claim 16 recites, in part, “a first data-capture arrangement for capturing a locality indicator using the cellular radio communication sub-system, the locality indicator indicating a current locality of the mobile device; a short-range communication sub-system distinct from the cellular radio communication sub-system; a second data-capture arrangement for capturing local information by extracting it from transmitted data received from a transmission source using the short-range radio communication sub-system, the local information concerning information other than location information; and an information-retrieval arrangement for using the captured locality indicator and local information in combination to retrieve specific information having a relation to the current location of the mobile device.” Claim 22 recites “storing in a database a plurality of data records each associated with a respective fixed short-range transmitter and holding items of local information extracted from data transmitted by the corresponding transmitter, each data record being further associated with a locality indicator indicating the locality of the transmitter associated with the record; and receiving a database search request including a particular locality indicator and a particular item of local information, and searching the

database for a match". Claim 24 recites, in part, "a request handler for receiving a request via the communications interface for specific information having a relation to a location indicated by a locality indicator and local information included in the request, the request handler being arranged to use said locality indicator and local information included in the request to find the data record of the short-range transmitter that transmitted the local information, and to return from the said further information associated with that record, the requested specific information." The Applicants believe that these features are not disclosed or taught in the cited references.

With respect to claim 22, the Examiner asserts that Kauser teaches storing the locality indicator and local information in the mobile device and subsequently using them to retrieve the specific information. However, claim 22 concerns a service method involving storing a plurality of records, one for each transmitter of local information, with each record holding local information transmitted by the transmitter concerned and being associated with a locality indicator. These records are searched in response to a request including a particular locality indicator and particular items of local information. Kauser does not disclose such a search.

Claim 24 is rejected over the combination of Kauser, Smith and Rangedahl. The database of Rangedahl holds authorization information and, although not explicitly disclosed, it is obvious that this authorization information is arranged by remote-device ID. In other words, there could be a record for each remote device giving its ID and the locations for which it is authorized. It could then be argued that the remote devices of Rangedahl

are the transmitters of claim 24 with the local information stored in respect of each device being the device ID. However, even with the foregoing assumptions, the records of Rangedahl are not associated with the actual locality of the device as recited by claim 24, but merely with authorized locations. Due to the very different functions of Rangedahl and Kauser, it is difficult to see what combination of the two references is permissible other than using the Kauser arrangement to provide the location information required by Rangedahl. Such a combination would not lead to the service system recited by claim 24 or the method in claim 22.

Due to the reasons stated above, the Applicants respectfully submit that claims 16, 22 and 24 are also patentable. Claims 17-18, 20-21, 23 and 25-26 are patentable, at least by virtue of their dependency from claim 16, claim 22, or claim 24. Thus, the Applicants believe that all pending claims are patentable and reconsideration of the present application is respectfully requested.

The Commissioner is authorized to charge any additional fees which may be required or credit overpayment to deposit account No. 12-0415. In particular, if this response is not timely filed, then the Commissioner is authorized to treat this response as including a petition to extend the time period pursuant to 37 CFR 1.136 (a) requesting an extension of time of the number of months necessary to make this response timely filed and the petition fee due in connection therewith may be charged to deposit account no. 12-0415.

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Respectfully submitted,



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